ABSTRACT

A surface of a graphite target (139), irradiated with a laser beam (103), is formed in a plane. The graphite target (139) is held by a target holding unit (153) on a target supply plate (135). A plate holding unit (137) moves the target supply plate (135) in a translational manner, which allows an irradiation position of the laser beam (103) and the surface of the graphite target (139) to be relatively moved. A transportation pipe (141) communicated with a nanocarbon collecting chamber (119) is provided toward a direction in which a plume (109) is generated, and a generated carbon nanohorn aggregates (117) is collected in the nanocarbon collecting chamber (119).